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3. The method of claim 2, the method further comprising protecting the sugar alcohol from substantial alteration in the rumen of the ruminant.

- 4. The method of claim 2, the method further comprising protecting the sugar alcohol from any alteration in the rumen of the ruminant.
- 8. The method of claim 1 wherein enhancing milk component production comprises enhancing the weight percent of true protein, the weight percent of fat, the weight percent of lactose, the weight percent of total solids, or any combination of these in milk produced by the ruminant.
- 9. The method of claim 1 wherein the sugar alcohol is D-arabinitol, L-arabinitol, erythritol, galactitol, inositol, mannitol, perseitol, ribitol, sorbitol, xylitol, glycerol, or any combination of these.
- 10. A method of feeding a ruminant, the method comprising: providing a feed that comprises a sugar alcohol; and supplying the sugar alcohol to the abomasum of the ruminant, the sugar alcohol effective to enhance milk component production by the ruminant.
- 11. The method of claim 10 wherein supplying the sugar alcohol to the abomasum of the ruminant comprises:

protecting the sugar alcohol from significant alteration in the rumen of the ruminant; and orally feeding the feed to the ruminant.

- 13. The method of claim 10 wherein the sugar alcohol is D-arabinitol, L-arabinitol, erythritol, galactitol, inositol, mannitol, perseitol, ribitol, sorbitol, xylitol, glycerol or any combination of these.
- 14. The method of claim 10 wherein the sugar alcohol that is supplied to the abomasum of the ruminant is effective to enhance the weight percent of true protein, the weight percent of fat, the

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weight percent of lactose, the weight percent of total solids, or any combination of these in milk produced by the ruminant.

- 28. The method of claim 1 wherein the sugar alcohol is ruminally-protected.
- 29. The method of claim 1 wherein enhancing milk component production comprises enhancing the weight percent of true protein in milk produced by the ruminant.
- 30. The method of claim 1 wherein enhancing milk component production comprises enhancing the weight percent of lactose in milk produced by the ruminant.
- 31. The method of claim 1 wherein enhancing milk component production comprises enhancing the weight percent of fat in milk produced by the ruminant.
- 32. The method of claim 1 wherein enhancing milk component production comprises enhancing the weight percent of total solids in milk produced by the ruminant.
- 33. The method of claim 10 wherein the sugar alcohol is ruminally-protected.
- 34. The method of claim 10 wherein enhancing milk component production comprises enhancing the weight percent of true protein in milk produced by the ruminant.
- 35. The method of claim 10 wherein enhancing milk component production comprises enhancing the weight percent of lactose in milk produced by the ruminant.
- 36. The method of claim 10 wherein enhancing milk component production comprises enhancing the weight percent of fat in milk produced by the ruminant.

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37. The method of claim 10 wherein enhancing milk component production comprises enhancing

the weight percent of total solids in milk produced by the ruminant.

38. The method of claim 2 wherein protecting the sugar alcohol from significant alteration in the

rumen of the ruminant allows at least about 50 weight percent of the sugar alcohol that is orally

ingested by the ruminant to arrive unaltered, as sugar alcohol, in the abomasum of the ruminant after

passing through the rumen of the ruminant.

39. The method of claim 2, the method further comprising protecting the sugar alcohol from

alteration in the rumen of the ruminant to a degree that allows at least about 75 weight percent of the

sugar alcohol that is orally ingested by the ruminant to arrive unaltered, as sugar alcohol, in the

abomasum of the ruminant after passing through the rumen of the ruminant.

40. The method of claim 2, the method further comprising protecting the sugar alcohol from

alteration in the rumen of the ruminant to a degree that allows at least about 90 weight percent of the

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sugar alcohol that is orally ingested by the ruminant to arrive unaltered, as sugar alcohol, in the,

abomasum of the ruminant after passing through the rumen of the ruminant.

41. The method of claim 11 wherein protecting the sugar alcohol from significant alteration in

the rumen of the ruminant allows at least about 50 weight percent of the sugar alcohol that is orally

ingested by the ruminant to arrive unaltered, as sugar alcohol, in the abomasum of the ruminant after

passing through the rumen of the ruminant.

42. The method of claim 11, the method further comprising protecting the sugar alcohol from

alteration in the rumen of the ruminant to a degree that allows at least about 75 weight percent of the

sugar alcohol that is orally ingested by the ruminant to arrive unaltered, as sugar alcohol, in the

abomasum of the ruminant after passing through the rumen of the ruminant.

- 43. The method of claim 11, the method further comprising protecting the sugar alcohol from alteration in the rumen of the ruminant to a degree that allows at least about 90 weight percent of the sugar alcohol that is orally ingested by the ruminant to arrive unaltered, as sugar alcohol, in the abomasum of the ruminant after passing through the rumen of the ruminant.
- 44. A method of enhancing the weight percent of true protein in milk produced by a ruminant, the method comprising:

providing a feed that comprises a ruminally-protected sugar alcohol; and supplying the sugar alcohol to the abomasum of the ruminant.

45. A method of enhancing the weight percent of lactose in milk produced by a ruminant, the method comprising:

providing a feed that comprises a ruminally-protected sugar alcohol; and supplying the sugar alcohol to the abomasum of the ruminant.

46. A method of enhancing the weight percent of fat in milk produced by a ruminant, the method comprising:

providing a feed that comprises a ruminally-protected sugar alcohol; and supplying the sugar alcohol to the abomasum of the ruminant.

47. A method of enhancing the weight percent of total solids in milk produced by a ruminant, the method comprising:

providing a feed that comprises a ruminally-protected sugar alcohol; and supplying the sugar alcohol to the abomasum of the ruminant.

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48. A method of enhancing the weight percent of true protein, lactose, fat, total solids, or any combination of any of these in milk produced by a ruminant, the method comprising: providing a feed that comprises a ruminally-protected sugar alcohol; and supplying the sugar alcohol to the abomasum of the ruminant.

- 49. A method of feeding a ruminant, the method comprising:

  providing a feed that comprises a ruminally-protected sugar alcohol; and
  supplying the sugar alcohol to the abomasum of the ruminant, the sugar alcohol effective to
  enhance the weight percent of true protein in milk produced by the ruminant.
- 50. A method of feeding a ruminant, the method comprising:

  providing a feed that comprises a ruminally-protected sugar alcohol; and
  supplying the sugar alcohol to the abomasum of the ruminant, the sugar alcohol effective
  enhance to the weight percent of lactose in milk produced by the ruminant.
- 51. A method of feeding a ruminant, the method comprising:

  providing a feed that comprises a ruminally-protected sugar alcohol; and
  supplying the sugar alcohol to the abomasum of the ruminant, the sugar alcohol effective to
  enhance the weight percent of fat in milk produced by the ruminant.
- 52. A method of feeding a ruminant, the method comprising:

  providing a feed that comprises a ruminally-protected sugar alcohol; and
  supplying the sugar alcohol to the abomasum of the ruminant, the sugar alcohol effective to
  enhance the weight percent of total solids in milk produced by the ruminant.

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53. A method of feeding a ruminant, the method comprising:

providing a feed that comprises a ruminally-protected sugar alcohol; and
supplying the sugar alcohol to the abomasum of the ruminant, the sugar alcohol effective to
enhance the weight percent of true protein, lactose, fat, total solids, or any
combination of any of these in milk produced by the ruminant.

- 54. The method of claim 1 wherein the sugar alcohol is allitol, altritol, dulcitol, erythritol; galaxitol, glucitol, iditol, inositol, isomalt, lactitol, maltitol, mannitol, perseitol, rhamnitol, threitol, sorbitol, glycerol, or any of these in any combination.
- The method of claim 1 wherein the sugar alcohol is sorbitol, glycerol, or any of these in any combination.
- 56. The method of claim 1 wherein the sugar alcohol is glycerol.
- 57. The method of claim 10 wherein the sugar alcohol is allitol, altritol, dulcitol, erythritol; galaxitol, glucitol, iditol, inositol, isomalt, lacticol, maltitol, mannitol, perseitol, rhamnitol, threitol, sorbitol, glycerol, or any of these in any combination.
- 58. The method of claim 10 wherein the sugar alcohol is sorbitol, glycerol, or any of these in any combination.
- 59. The method of claim 10 wherein the sugar alcohol is glycerol.
- 60. The method of claim 49 wherein the sugar alcohol is allitol, altritol, dulcitol, erythritol; galaxitol, glucitol, iditol, inositol, isomalt, lactitol, maltitol, mannitol, perseitol, rhamnitol, threitol, sorbitol, glycerol, or any of these in any combination.

- 61. The method of claim 49 wherein the sugar alcohol is glycerol, sorbitol, or any combination of these.
- 62. The method of claim 49 wherein the sugar alcohol comprises glycerol or sorbitol.
- 63. The method of claim 50 wherein the sugar alcohol is allitol, altritol, dulcitol, erythritol; galaxitol, glucitol, iditol, inositol, isomalt, lactitol, maltitol, mannitol, perseitol, rhamnitol, threitol, sorbitol, glycerol, or any of these in any combination.
- 64. The method of claim 50 wherein the sugar alcohol is glycerol, sorbitol, or any combination of these.
- 65. The method of claim 50 wherein the sugar alcohol comprises glycerol or sorbitol.
- 66. The method of claim 51 wherein the sugar alcohol is allitol, altritol, dulcitol, erythritol; galaxitol, glucitol, iditol, inositol, isomalt, lactitol, maltitol, mannitol, perseitol, rhamnitol, threitol, sorbitol, glycerol, or any of these in any combination.
- 67. The method of claim 51 wherein the sugar alcohol is glycerol, sorbitol, or any combination of these.
- 68. The method of claim 5 wherein the sugar alcohol comprises glycerol or sorbitol.
- 69. The method of claim 52 wherein the sugar alcohol is allitol, altritol, dulcitol, erythritol; galaxitol, glucitol, iditol, inositol, isomalt, lactitol, maltitol, mannitol, perseitol, rhamnitol, threitol, sorbitol, glycerol, or any of these in any combination.

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70. The method of claim 52 wherein the sugar alcohol is glycerol, sorbitol, or any combination of these.

71. The method of claim 52 wherein the sugar alcohol comprises glyeerol or sorbitol.

72. The method of claim 53 wherein the sugar alcohol is allitol, altritol, dulcitol, erythritol; galaxitol, glucitol, iditol, inositol, isomalt, lactitol, maltitol, mannitol, perseitol, rhamnitol, threitol, sorbitol, glycerol, or any of these in any combination.

73. The method of claim 53 wherein the sugar alcohol is glycerol, sorbitol, or any combination of these.

74. The method of claim 53 wherein the sugar alcohol comprises glycerol or sorbitol.

75. A method of enhancing milk component production in a ruminant, the method comprising; providing a feed that comprises sorbitol; and supplying the sorbitol to the abomasum of the ruminant.

76. The method of claim 75 wherein supplying the sorbitol to the abomasum of the ruminant comprises:

protecting the sorbitol from significant alteration in the rumen of the ruminant; and orally feeding the feed to the ruminant.

77. The method of claim 75 wherein enhancing milk component production comprises enhancing the weight percent of true protein, the weight percent of fat, the weight percent of lactose, the weight percent of total solids, or any combination of these in milk produced by the ruminant.



- 78. The method of claim 77 wherein protecting the sorbitol from significant alteration in the rumen of the ruminant allows at least about 50 weight percent of the sorbitol that is orally ingested by the ruminant to arrive unaltered, as sorbitol, in the abomasum of the ruminant after passing through the rumen of the ruminant.
- 79. A method of feeding a ruminant, the method comprising:

  providing a feed that comprises sorbitol; and
  supplying the sugar alcohol to the abomasum of the ruminant, the sorbitol effective to
  enhance milk component production by the ruminant.
- 80. The method of claim 79 wherein supplying the sorbitol to the abomasum of the ruminant comprises:
  - protecting the sorbitol from significant alteration in the rumen of the ruminant; and orally feeding the feed to the ruminant.
- 81. The method of claim 79 wherein enhancing milk component production comprises enhancing the weight percent of true protein, the weight percent of fat, the weight percent of lactose, the weight percent of total solids, or any combination of these in milk produced by the ruminant.
- 82. The method of claim 81 wherein protecting the sorbitol from significant alteration in the rumen of the ruminant allows at least about 50 weight percent of the sorbitol that is orally ingested by the ruminant to arrive unaltered, as sorbitol, in the abomasum of the ruminant after passing through the rumen of the ruminant.